

Application/Control Number: 09/775,492  
Art Unit: 2611  
September 17, 2007  
Page 6

Remarks

It is observed that in the Examiner's communication dated July 31, 2007 the Examiner confirmed that the rejections under 35 U.S.C. 101 are withdrawn and that claim 1 is ok as written.

The applicant has in any case amended claim 1 in compliance with the Examiner's suggestion under "Claim Objections" of the Office Action dated March 16, 2007. Thus, two "," have been inserted in line 4 of claim 1.

As far as the rejections under 35 U.S.C. 112, it is observed that the Examiner requested, in the Communication dated July 31, 2007, that an explanation of the adder be provided.

Therefore, the applicant herewith encloses an explanation of the adder and in particular of the signal that is added, so as to clarify the matter.

It is not clear to the applicant if this explanation is to be provided as a remark or if it has to be introduced in the specification.

Thus, the applicant, for the time being, provides the requested explanation as a remark, reserving to introduce it in the specification if the Examiner wishes to do so and if the explanation will be considered exhaustive by the Examiner.

The function of the "adder" or better the function of the addition of the signal claimed in claim 1 is the key difference between the applicant's claimed method and any prior art methods.

The added signal (waveform) has a periodic nature and thus it can be easily generated with excellent phase noise and, in time domain, jitter.

The added signal determines the start and stop of the portion of the incoming signal that is

Application/Control Number: 09/775,492  
Art Unit: 2611  
September 17, 2007  
Page 7

to be converted (transformed) and therefore the quadrature of the I and Q signals. The phase error between I and Q is normally related to the position of Q samples between two consecutive I samples (or I samples between two Q samples). By using periodic waveform with intrinsic stable period to determine the position of the Q (or I) sample, it will be possible to provide also intrinsic stable position at zero phase error.

Although it is believed that the application is in an allowable condition, the applicant is ready to improve it according to the Examiner's suggestions.

Respectfully submitted,



Daniel O'Byrne (Reg. No. 36,625)

Agent for the Applicant

Date: September 17, 2007  
Address: Via Meravigli 16, 20123 MILAN-ITALY  
Telephone: (from USA) (011)(39)(02)8590-7777  
Telefax: (from USA)(011)(39)(02)863-860